

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application.

Listing of Claims

Claim 1 (Currently Amended): A dicing and die bonding pressure-sensitive adhesive sheet comprising a base material and a pressure-sensitive adhesive layer disposed thereon, the pressure-sensitive adhesive layer having a ratio (M_{100}/M_{70}) of a modulus of elasticity at 100°C (M_{100}) to a modulus of elasticity at 70°C (M_{70}) being 0.5 or less, wherein the pressure-sensitive adhesive layer comprises a pressure-sensitive component, a thermosetting component and a thermoplastic resin having a glass transition temperature of 60 to 150°C, the pressure-sensitive component comprising an acrylic polymer having a weight-average molecular weight of 30,000 to 500,000 and containing repeating units derived from vinyl acetate in an amount of 5 to 50% by mass, and

wherein the weight ratio of the acrylic polymer and the thermoplastic resin (acrylic polymer/thermoplastic resin) ranges from 9/1 to 3/7.

Claims 2-5 (Cancelled).

Claim 6 (Previously Presented): The dicing and die bonding pressure-sensitive adhesive sheet according to claim 1, wherein the base material has a surface tension of 40 mN/m or less at a surface which contacts with the pressure-sensitive adhesive layer.

Claim 7 (Withdrawn): A process for producing semiconductor devices, the process comprising sticking a semiconductor wafer onto the pressure-sensitive adhesive layer of the dicing and die bonding pressure-sensitive adhesive sheet as claimed in claim 1, dicing the semiconductor wafer into IC chips, picking up the IC chips from the base material while allowing the pressure-sensitive adhesive layer to remain adhered to the IC chips, and bonding the

IC chips onto die pads by means of the pressure-sensitive adhesive layer with the application of heat and pressure.

Claim 8 (Currently Amended): The dicing and die bonding pressure-sensitive adhesive sheet according to ~~claim 3~~ claim 1, wherein the pressure-sensitive adhesive layer further contains a thermoplastic resin having a glass transition temperature of 60 to 150°C.

Claim 9 (Currently Amended): The dicing and die bonding pressure-sensitive adhesive sheet according to ~~claim 2~~ claim 1, wherein the base material has a surface tension of 40 mN/m or less at a surface which contacts with the pressure-sensitive adhesive layer.

Claim 10 (Currently Amended): The dicing and die bonding pressure-sensitive adhesive sheet according to ~~claim 3~~ claim 1, wherein the base material has a surface tension of 40 mN/m or less at a surface which contacts with the pressure-sensitive adhesive layer.

Claim 11 (Currently Amended): The dicing and die bonding pressure-sensitive adhesive sheet according to ~~claim 4~~ claim 1, wherein the base material has a surface tension of 40 mN/m or less at a surface which contacts with the pressure-sensitive adhesive layer.

Claim 12 (Currently Amended): The dicing and die bonding pressure-sensitive adhesive sheet according to ~~claim 5~~ claim 1, wherein the base material has a surface tension of 40 mN/m or less at a surface which contacts with the pressure-sensitive adhesive layer.

Claim 13 (Withdrawn): A process for producing semiconductor devices, the process comprising sticking a semiconductor wafer onto the pressure-sensitive adhesive layer of the dicing and die bonding pressure-sensitive adhesive sheet as claimed in claim 2, dicing the semiconductor wafer into IC chips, picking up the IC chips from the base material while allowing the pressure-sensitive adhesive layer to remain adhered to the IC chips, and bonding the

IC chips onto die pads by means of the pressure-sensitive adhesive layer with the application of heat and pressure.

Claim 14 (Withdrawn): A process for producing semiconductor devices, the process comprising sticking a semiconductor wafer onto the pressure-sensitive adhesive layer of the dicing and die bonding pressure-sensitive adhesive sheet as claimed in claim 3, dicing the semiconductor wafer into IC chips, picking up the IC chips from the base material while allowing the pressure-sensitive adhesive layer to remain adhered to the IC chips, and bonding the IC chips onto die pads by means of the pressure-sensitive adhesive layer with the application of heat and pressure.

Claim 15 (Withdrawn): A process for producing semiconductor devices, the process comprising sticking a semiconductor wafer onto the pressure-sensitive adhesive layer of the dicing and die bonding pressure-sensitive adhesive sheet as claimed in claim 4, dicing the semiconductor wafer into IC chips, picking up the IC chips from the base material while allowing the pressure-sensitive adhesive layer to remain adhered to the IC chips, and bonding the IC chips onto die pads by means of the pressure-sensitive adhesive layer with the application of heat and pressure.

Claim 16 (Withdrawn): A process for producing semiconductor devices, the process comprising sticking a semiconductor wafer onto the pressure-sensitive adhesive layer of the dicing and die bonding pressure-sensitive adhesive sheet as claimed in claim 5, dicing the semiconductor wafer into IC chips, picking up the IC chips from the base material while allowing the pressure-sensitive adhesive layer to remain adhered to the IC chips, and bonding the IC chips onto die pads by means of the pressure-sensitive adhesive layer with the application of heat and pressure.

Claim 17 (Withdrawn): A process for producing semiconductor devices, the process comprising sticking a semiconductor wafer onto the pressure-sensitive adhesive layer of the dicing and die bonding pressure-sensitive adhesive sheet as claimed in claim 6, dicing the semiconductor wafer into IC chips, picking up the IC chips from the base material while allowing the pressure-sensitive adhesive layer to remain adhered to the IC chips, and bonding the IC chips onto die pads by means of the pressure-sensitive adhesive layer with the application of heat and pressure.